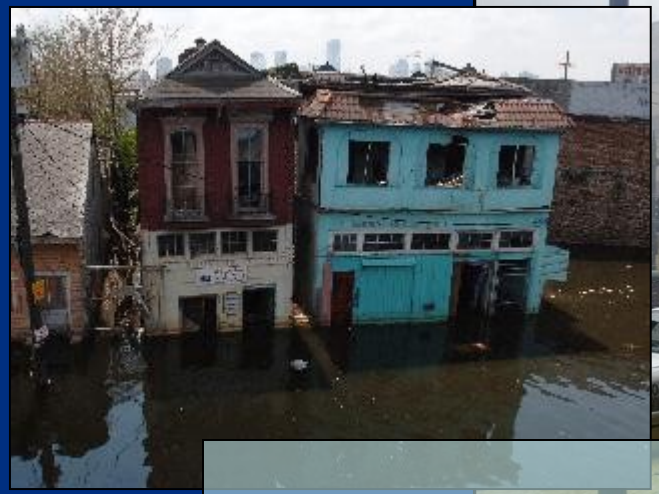

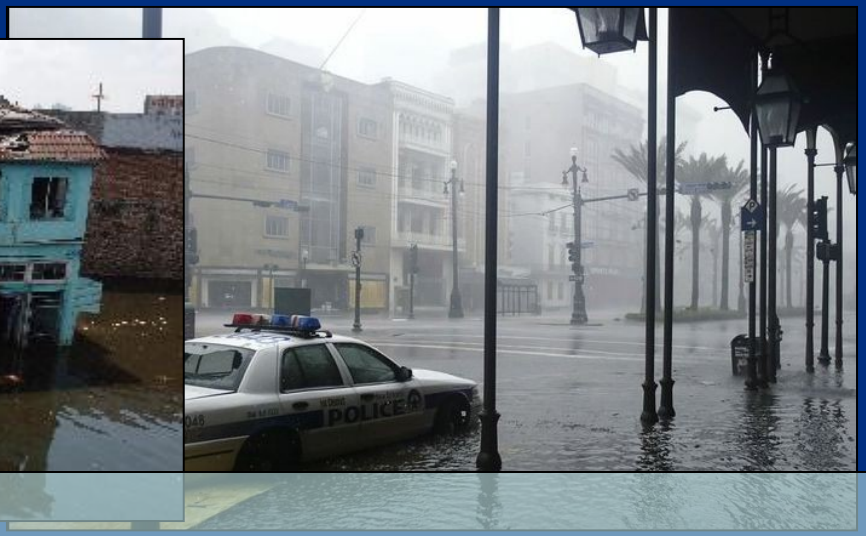

Hurricane Katrina in Louisiana

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What Made Katrina Different?

- Magnitude
- Situational awareness
- Continuity of government operations
- Mass evacuation operations
- Security issues
- Hotels, cruise ships as shelter
- We had Hurricane “Pam”

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The Katrina Dilemma

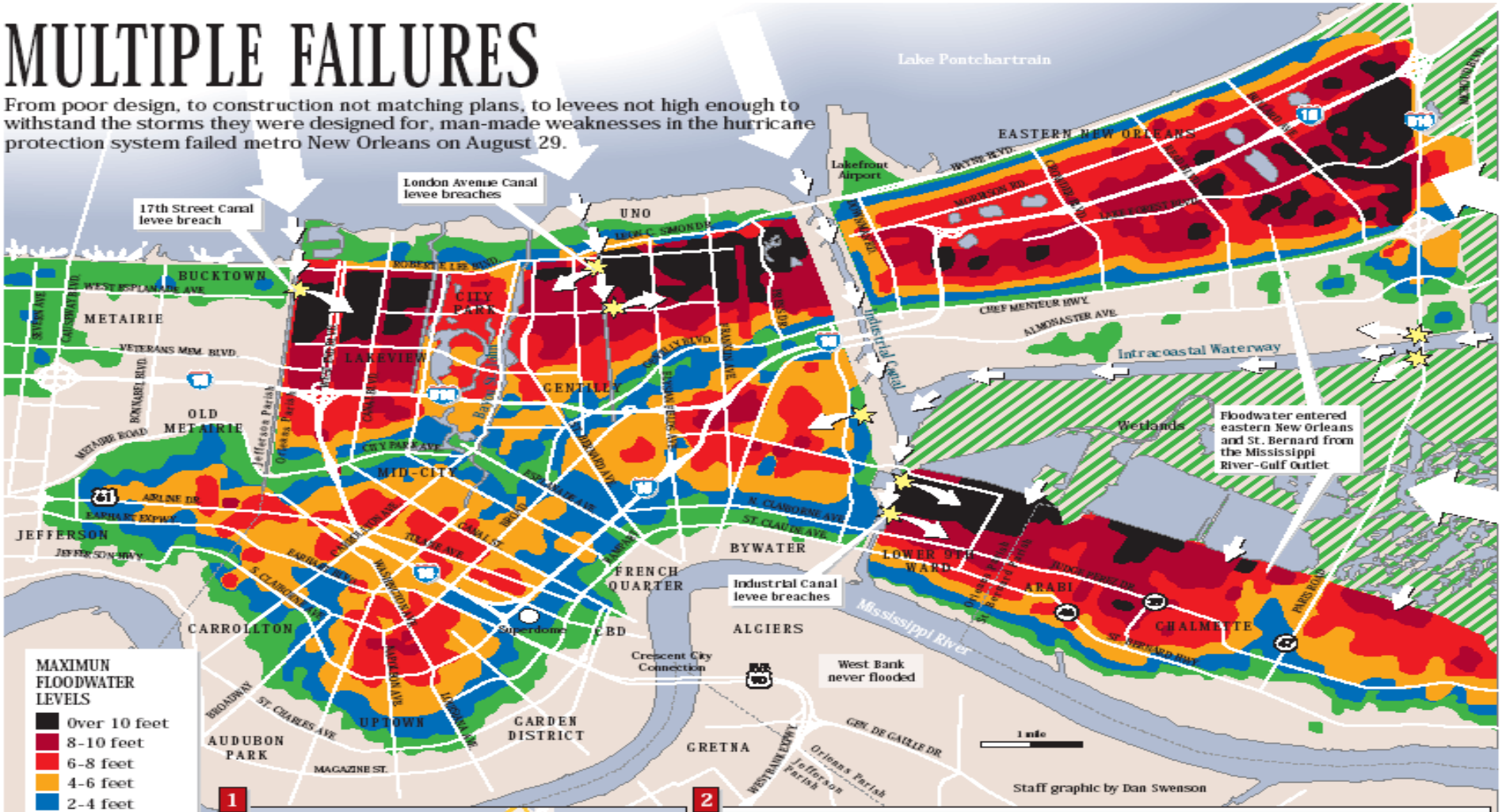
- In this disaster, we did more than we ever did before, and did it faster
  - Truckloads of commodities
  - Rescues
  - Patients treated
  - Travel trailers set up

- But we also had more unmet needs than in any disaster before

FEMA

MULTIPLE FAILURES

From poor design, to construction not matching plans, to levees not high enough to withstand the storms they were designed for, man-made weaknesses in the hurricane protection system failed metro New Orleans on August 29.



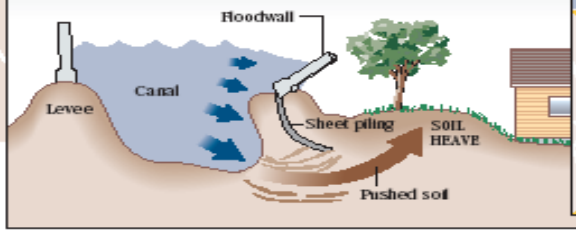
Staff graphic by Dan Swenson

1 EARLY MORNING, MONDAY

A towering storm surge ahead of Katrina channeled down the MR-GO, gaining speed and height as it made its way into St. Bernard Parish and the Lower 9th Ward. The earthern levees that line the MR-GO were overtopped by a surge far higher than was anticipated for a Category 3 storm, while the concrete walls along the Industrial Canal were breached.

2 MID-MORNING, MONDAY

At two points along the London Avenue Canal and one point along the 17th Street Canal, concrete walls atop earthen berms were simply pushed aside by the pressure of the water backing into the canals from Lake Pontchartrain. Evidence suggests that too-shallow pilings were driven into soft, peaty soils, allowing water to undermine the levees from below.



Note: Maximum water levels at specific points may vary greatly as topography can change drastically, for example from any given street to any given house. Foundation.
Sources: C&C Technologies Survey Services, www.mapper.ccschmel.com/floodmap.php, LSU Hurricane Center

The Stranded: Two Disasters

- The Superdome
  - Pre-landfall
  - “Shelter of Last Resort”
- The Convention Center
  - Post-landfall
  - Emerged during the response

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Evacuations

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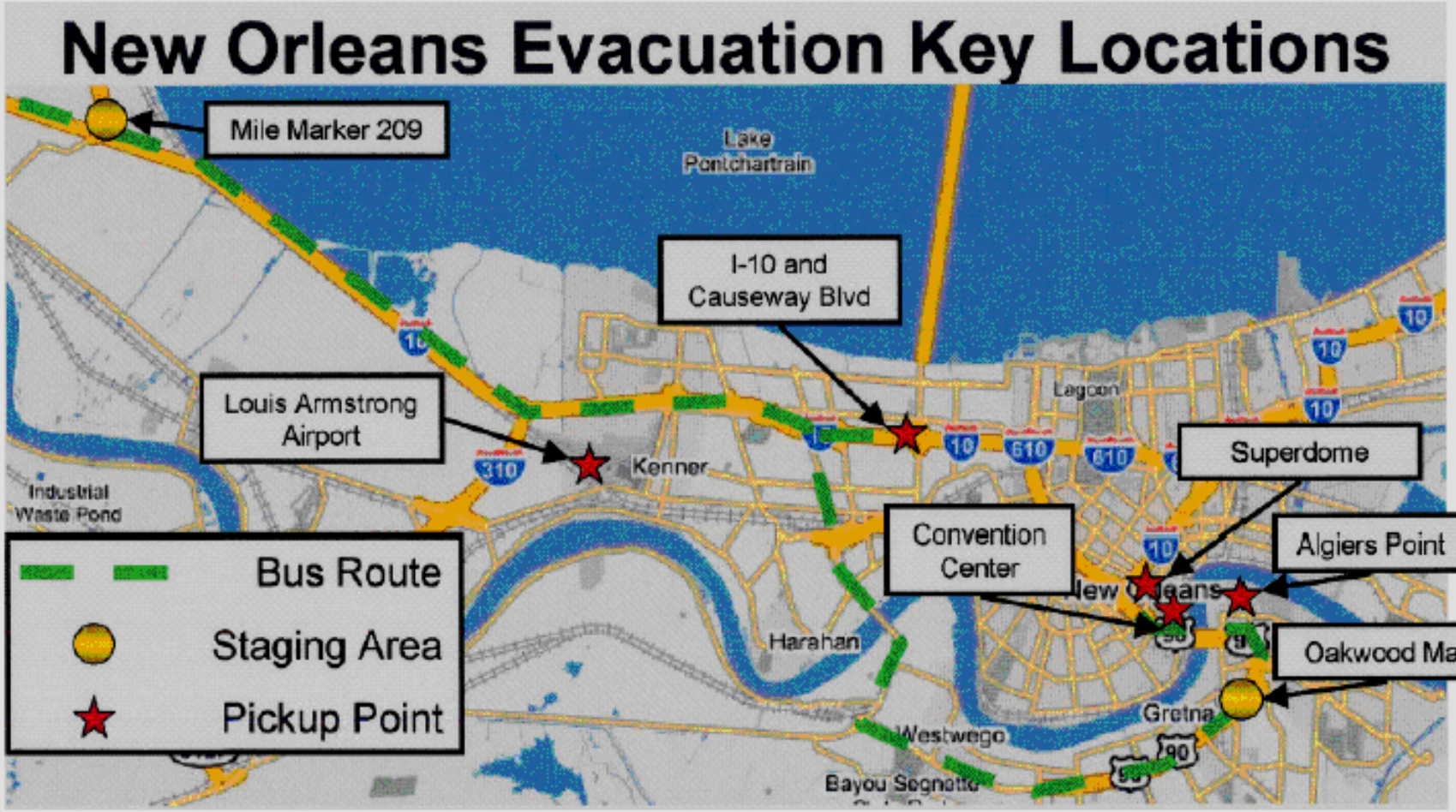
New Orleans Evacuation Key Locations



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Lack of Situational Awareness

- Problems
  - Equipment
  - People
  - Shared processes

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Staffing Issues

- We are stretched very thin on capable, experienced staff
- Most federal response team members are not primarily employed in response operations
- For example, in the critical early response, FEMA could not adequately sustain 24-hour ERT operations
- Policies inhibited a rapid buildup of federal personnel

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Fed/State/Local Relationships

- The local governments nearly collapsed
- Need to prepare for Continuity of Government support in future disasters (e.g., Civil Affairs specialists)
- "Pull" versus "push". Stafford Act versus ICS
- Need to strengthen emergency management capability at the State and local level
  - People
  - Training
  - Need buy-in
- Loans instead of grants would create more fiscal responsibility

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JFO/AFO Operations

- FCO authority not commensurate with responsibility
- AFO program employees had concerns about having "two bosses," despite our efforts to be clear about it
- Command versus coordination role of the FCO
- Should JFO follow the ICP model?
- Need to empower federal personnel on the ground

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Logistics Issues

- Fuel shortages
- Oxygen shortages
- Need pre-negotiated contracts
- Need to pre-stage commodities, even in the impact zone
- Lack of credit cards, warrant capability in the field

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Medical Issues

- Restoring acute care under local control has been very difficult, largely tied to financing
- Hospital coverage should be considered "critical infrastructure"
- DMORT went beyond their usual mission scope

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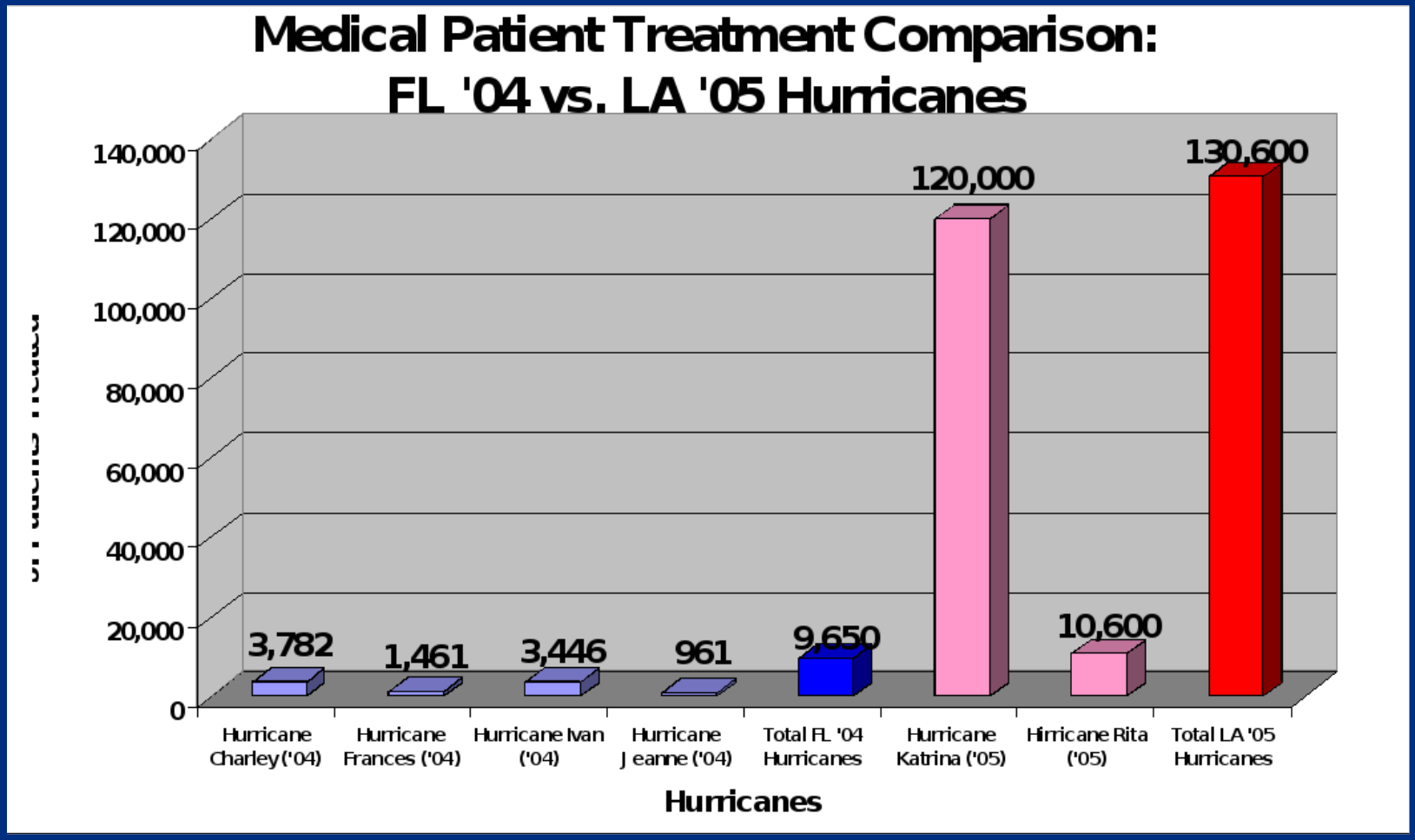
Patient Treatment



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Temp Housing Program

- Cost-Plus contracting does not work
- The IA community is too inflexible
- Need a catastrophic housing plan
- Cruise ships

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External Affairs

- Reactive versus proactive
- The other side of the story never got told
- FEMA became scapegoat for everyone's sins

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Recovery Issues

- Does Long-Term Community Recovery make sense as an ESF?

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Will Louisiana's Spirit Survive?

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